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MARSH, FISCHMANN & BREYFOGLE LLP  
3151 SOUTH VAUGHN WAY  
SUITE 411  
AURORA, CO 80014

EXAMINER

GRAYSAY, TAMARA L

ART UNIT	PAPER NUMBER
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3636

DATE MAILED: 01/18/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/758,131

Applicant(s)

CHOI, KYONG JAI

Examiner

Tamara L. Graysay

Art Unit

3636

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-6 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-6 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on \_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_.

## **DETAILED ACTION**

### ***Inventorship***

1. In view of the papers filed 27 December 2005, it has been found that this nonprovisional application, as filed, through error and without deceptive intent, improperly set forth the inventorship, and accordingly, this application has been corrected in compliance with 37 CFR 1.48(a). The inventorship of this application has been changed by addition of Pat Snyder, James Louis Gianladis, and Curt Lyn Dinges.

The application will be forwarded to the Office of Initial Patent Examination (OIPE) for issuance of a corrected filing receipt, and correction of Office records to reflect the inventorship as corrected.

### ***Priority***

2. Receipt is acknowledged of a certified copy of the Korean application referred to in the original oath or declaration or in an application data sheet. However, subsequent to (and possibly due to) the change of inventorship benefit of the Korean application has not been claimed in the substitute oath or declaration.

***Drawings***

3. The drawings are objected to because of the following:
  - a. They fail to comply with 37 CFR 1.84(h)(3) because the section line designations do not correspond to the figure number in which the section view is depicted. For example, C-C should be 2-2 or II-II, D-D should be 3-3 or III-III, etc.
  - b. They fail to comply with 37 CFR 1.84(p)(5) because they include the following reference character(s) not mentioned in the description: 11 (FIG. 1).
  - c. They fail to comply with 37 CFR 1.84(u)(2) because the view numbers are not larger than the numbers used for reference characters.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

*Specification*

4. The disclosure is objected to because of the following informalities:
  - a. Page 2, line 9, [outer door fabric 12] should be outer door fabric 2.
  - b. Pages 6-7, as noted in paragraph (1)(a) above, appropriate correction should be made to the brief description of the drawings.
  - c. Page 15, line 21, [rainwater guiding fabric 11] should be rainwater guiding fabric 118.

Appropriate correction is required.

5. The use of the trademark Velcro has been noted in this application. It should be capitalized wherever it appears and be accompanied by the generic terminology.

Although the use of trademarks is permissible in patent applications, the proprietary nature of the marks should be respected and every effort made to prevent their use in any manner which might adversely affect their validity as trademarks.

*Claim Objections*

6. Claims 1-6 are objected to because of the following informalities:
- a. Claim 1, line 12: [the sewing line part] should be a sewing line part because of a lack of antecedent basis for the term in the claim.
  - b. Claim 2, line 2: [a second zipper tape] should be the second zipper tape because the term is previously recited in claim 1; and, the term and should be inserted before “to” for clarity.
  - c. Claim 2, lines 3, 5 and 7: [outdoor fabric] should be outer door fabric for consistency with that recited at claim 1.
  - d. Claim 3, line 2: [the bottom] should be a bottom because of a lack of antecedent basis for the term in the claim.
  - e. Claim 3, line 3: [bottom support tape] should be bottom zipper tape for consistency with that recited in claim 1.
  - f. Claim 3, line 5: [inner and outdoor fabrics] should be inner and outer door fabrics for consistency with that recited at claim 1.
  - g. Claim 4, line 3: [outdoor fabric] should be out door fabric for consistency.
  - h. Claim 4, line 12: [the first supplementary fabric] should be a first supplementary fabric because of a lack of antecedent basis for the term in the claim.
  - i. Claim 4, line 14: [the rainwater guiding fabric] should be a rainwater guiding fabric because of a lack of antecedent basis for the term in the claim.

Art Unit: 3636

- j. Claim 4, line 22: [the first waterproof tape] should be a first waterproof tape because of a lack of antecedent basis for the term in the claim.
- k. Claim 4, line 23: [body fabric] should be first supplementary fabric as described in the specification and depicted in the drawing figures.
- l. Claim 4, line 24: [sewing step] should be step of sewing and attaching the rainwater guide and inner door fabric to the first supplementary fabric because there are two sewing steps recited in antecedent.
- m. Claim 5, line 2: [the second supplementary fabric] should be a second supplementary fabric because of a lack of antecedent basis for the term in the claim; and, [fabrics] should be fabric.
- n. Claim 5, line 4: [the second waterproof tape] should be a second waterproof tape because of a lack of antecedent basis for the term in the claim; and, [port] should be part.
- o. Claim 5, line 5: [fabrics] should be fabric.
- p. Claim 6, line 2: [the rainwater fabric] should be a rainwater discharging fabric to provide antecedent basis for the recitation at lines 8-9; and [the bottom] should be a bottom for consistency with the recitation in claim 4, the description in the specification, and depiction in the drawing figures.
- q. Claim 6, line 4: [supper] should be zipper.
- r. Claim 6, line 6: [the bottom waterproof tape] should be a bottom waterproof tape because of a lack of antecedent basis for the term in the claim.

Appropriate correction is required.

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claims 1, 2, 4 and 5 are rejected under 35 U.S.C. 103(a) as being unpatentable over applicant's Admission of Prior Art in view of Chang (US-6668384) and Ferrone (US-2119621).

a. Claim 1: Applicant's Admission includes a tent door having first zipper tape (13) attached to an inner door fabric (12); a second zipper tape (3) attached to an outer door fabric (2) placed on the outside of the inner door fabric (12) so as to correspond to the first zipper tape (13); a vertical slider (4) that combines with or separates from the vertical zipper teeth (unnumbered) equipped in the first and second zipper tapes (13, 3); a bottom zipper tape (6) that is attached to a body fabric (1) corresponding to the first and second zipper tapes (13, 3); and a horizontal slider (14) that combines or separates the horizontal zipper teeth (unnumbered) of the first and second zipper tapes (13, 3) and the zipper teeth (unnumbered) of the bottom zipper tape (6). Applicant's Admission lacks the waterproof structure.

Chang (FIG. 11-13) teaches a waterproof structure having a first zipper tape (62) attached to a first supplementary fabric (51) that is capable of guiding rainwater; a rainwater guiding fabric (32) that is attached closely to the first supplementary fabric at one end (32b) and embraces the end of the inner door fabric (top layer 31 of 12) to form a space (gutter 35) for guiding rainwater; and a first waterproof tape (54, 34) attached to



the sewing line part at of the reverse of the first supplementary fabric (51) that appears by sewing together one end (32b) of the inner door fabric (layer 31 of 12) and rainwater guiding fabric (32) and first supplementary fabric (51). The particular structure is provides protection from stormy weather.

Although Chang is intended for use in a garment, applicant's attention is directed to Ferrone (US-2119621), which suggests that sliding garment closures were also used in the tent closure environment.

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Admission tent closure to include a waterproof structure, such as suggested by Chang and Ferrone, in order to protect the tent contents from stormy weather, including preventing water from entering the tent at the door closure.

b. Claim 2: Chang further teaches a second supplementary fabric (41) sewn to the second zipper tape (61) and to the outer fabric (22, 21); and a second waterproof tape (44, 24) attached to the reverse of the outer fabric so as to prevent rainwater from penetrating through the sewing line that is formed when sewing the second supplementary fabric to the outer fabric.

c. Claim 4: The combination as applied meets the method insofar as Chang '384 depicts sewing and attaching a first supplementary fabric (51) to the first zipper tape (62) represented by vertical lines at the end (52A) of the first supplementary fabric (51) in

FIGS. 11-12; folding both end portions of a guiding fabric (at end 32a, and the bend in the fabric (32) to the left of reference character 35 in FIG. 12); inserting the inner fabric (31) between the end portions of the folded guiding fabric (depicted in FIGS. 11-12); sewing and attaching one end portion (32a) of the guiding fabric and the inserted inner fabric (31a) to the first supplementary fabric (51) via the seams depicted with vertical lines between 34 and 54, and through 32a and 31a; and attaching a waterproof tape (54) to the sewing line part that is formed on the reverse of the first supplementary fabric as depicted in FIGS. 11-12. The broad recitation of second sewing and attaching step in the claim does not preclude two separate sewing seams, but rather only requires that the one end portion and guiding fabric be sewn and attached to the first supplementary fabric (51).

d. Claim 5: Chang '384 further depicts attaching and sewing a second supplementary fabric (41) to an outer fabric (2, 22, 21) as depicted in FIGS. 11 and 13 at reference character 23, to attaché the second zipper tape (61) to the outer fabric (22, 21); and attaching a second waterproof tape to the sewing line of the reverse of the outer fabric (e.g., resin 24 is a type of waterproofing that prevents fluid penetration through the seam).

Art Unit: 3636

8. Claims 3 and 6 are rejected under 35 U.S.C. 103(a) as being unpatentable over the Admission, Chang (US-6668384) and Ferrone (US-2119621) combination as applied to claim 1 above, and further in view of Chang (6651254) and Hexels (US-6691326).

a. Claim 3: Chang '254 teaches a discharging fabric (2, 21, 22, 23) that is sewn to a body fabric (11) together with the zipper tape (41) that is capable of performing the recited function. The discharging fabric (2, 21, 22, 23) is used to protect the zipper from penetration by fluid. It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the bottom body fabric (see Admission FIG. 3) of the Admission, Chang '384, and Ferrone combination to include a discharging fabric such as suggested by Chang '254 in order to direct any fluid away from the body fabric and the zipper. The modification lacks the waterproof tape at the reverse side of the body fabric.

Hexels (e.g., FIG. 6) teaches a seam sealing tape (11) for preventing fluid penetration of a sewn seam (10) adjacent a zipper (1, 2, 3).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to further modify the Admission, Chang '384, Ferrone, and Chang '254 combination to include a waterproofing seam sealing tape at the sewn seam interior, such as taught by the waterproof tape in Hexels, in order to prevent fluid from penetrating the seam. The structure recited in the claim is met by the combination, and the combination of references as applied to the claim is capable of performing the claimed functionality.

b. Claim 6: The combination as applied to claim 3 above applied equally to this claim. Chang '254 depicts sewing a fabric (21, 22) to a body fabric (11) with the zipper tape (41) ad represented by a vertical line directly above reference character 3 in FIG. 6 of Chang '254. Regarding the step of attaching the waterproof tape, the combination includes waterproof tape as depicted in Hexels, and attaching the waterproof tape is inherent in the combination as applied to claim 3. The method claim does not require the particular orientation of the zipper tape between the folded discharging fabric and sewing and attaching the discharging fabric and inserted second zipper tape to the body fabric as depicted in FIG. 7 of the present application.

***Conclusion***

9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.


- Lichten (US-1665856) teaches a sliding fastener having overlapping fabric.
- Loos (US-2264084) teaches a supplementary fabric FIGS. 6-7 for attaching a zipper tape 10 to a fabric 12.
- Rosenbaum (US-3417406) teaches a sliding fastener adapted to prevent fluid penetration.
- Bareis (US-3491388) teaches in FIG. 8, for example, a seam having a supplementary fabric (T) folded and receiving a fabric (15) therein and the composite attached to another fabric (C).
- Gerber (US-3515426) teaches offset sliding fasteners (68, 70) at a camper window.
- Rosser (US-3561073) teaches a method of attaching a zipper tape to adjacent fabric.
- Kelley (US-3880459) teaches sewing and attaching adjacent fabric(s) to a zipper tape for a tent window.
- Melarvie (US-4293957) teaches a sliding fastener attached to a supplementary fabric (20a) which is in turn attached to a body fabric (14).
- Chang (US-6675390) teaches a sliding fastener having overlapping fabric.

Art Unit: 3636

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tamara L. Graysay whose telephone number is (571) 272-6728. The examiner can normally be reached on Mon - Fri from 8:30am to 5:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Peter M. Cuomo, can be reached on (571) 272-6856. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

  
Tamara L. Graysay 1/11/06  
Examiner  
Art Unit 3636

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